## MATERIAL SAFETY DATA SHEET

SIPI METALS CORP. 1720 N. ELSTON AVENUE CHICAGO, 1L 60622

ID	ENTIFICATION					MAXIUM	PERCENT	AGE BY W			8				
NAME: BR	ASS, BRONZE INGOTS	Name & Number	Leaded Red Brass & Semi-Red Brass ナ CA# 830-849 こっれゃっ ma	Leaded Yellow Brass CA# 850-859	High Strength Yellow Brass Magnesca 10, 490 CA# 860-869 41/0	icone Bronze & 195 # 870-879	Bronze <i>SAE</i> 67 900-919 SAを 65 -6元?	3 Le 546 -929	ad Tin Bronze -945 <i>SAE 660</i> SAE 64	& Tin Bronze Tin Bronze -949	Aluninum Bronze CA# 950-959 <i>ABA-415</i> ABB-41c - ABC-417- ABO-4	o-Nickel 960-969	Leaded Nickel Bropze CA# 970-979	A110ys -995	rass
HAZARDOUS	COMPONENTS		led 1 - Re( 830	led 850	ss 72 860	cone ss 870	Broi 900 22	1ed 2	1-Lead 930-94	cel 2 Jed~ 946	950 950 14€	N-0- 960	Jed 1 970	Special CA# 990-	White Brass
CHEMICAL	CAS NO .	Trade	Lead Semi CA#	Leac CA#	High Bras CA#	Sill Bras	Tin CA#	Leaded 8 Bronge CA# 920.	High CA#	Nick Lead CA#	Alur CA# ABB	Cupro-Nic CA# 960-9	Leac CA#	Spec CA#	Whit
COPPERI	7440-50-8		89.8	73.0	66.0	96.8	89.8	90.8	85.8	87.0	89.0	87.6	67.8	90.0	61.(
TIN	7448-31-5		6.8	1.5	1.8	X	20.0	20.0	14.8	6.0	X	8.5	5.5	x	1.0
I LEADII	7439-92-1		7.7	3.5	1.3	1.0	X	5.7	27.8	5.7	X	X	11.0	x	2.5
	744-66-6		16.2	41.8	42.0	36.0	1.5	5.0	4.0	6.8	X	1.5	25.0	5.8	25.0
IRON	1389-37-1		χ	X	4.0	X	X	X	1	· x	5.0	1.8	1.8	5.5	1.8
NICKEL##	7449-02-8		1.5	.8	.8	.5	2.0	4.0	1.0	6.8	5.5	31.5	21.8	26.0	6.3
PHOSPHORU	S‡ 7723-14-0		X	χ.	X	X	1.0	1.8	I	X	x	X	Y	X	X
ALUMINUM	7429-98-5		X	X	7.5	X	X	X	1	X .	11.5	X	1	2.8	3.8
MANGANESE	<b>1</b> 7439-96-5		X	X	5.0	1.5	I	X	X	X	14.8	1.5	1.0	X	23.
SILICON	7440-21-3		X	X	X	5.5	X	Y	X	X	3.3	,	T x	2.0	X

## ISPECIAL INSTRUCTIONS FOR SARA 313 CHEMICALS

The chemicals present in this product are marked with an (1) are subject to reporting requirements of Section 313 of Title III of the Superfund Amendment and Reauthorization Act of 1986 in 40 CFR, Part 372. If no percentage is shown, the chemical represents less than 1% by weight of the product (if the chemical is not a carcinogen) or less than 0.1% (if the chemical is known or suspected carcinogen). This information must be included in all MSDS's that are copied and distributed for this material.

\*\*CALIFORNIA SAFE DRINKING WATER AND TOXIC ENFORCEMENT ACT OF 1986.

Chemical known to cause cancer: Nickel (CAS 744-02-0)

- Chemical known to cause reproductive toxicity: Lead (CAS 7439-92-1)



PHYSICAL DATA See appropriate attachment. REACTIVITY DATA See appropriate attachment. PHYSIOLOGICAL EFFECTS See appropriate attachment. SPECIAL PROTECTION INFORMATION **VENTILATION:** Local exhaust ventilation should be used to keep worker exposures within allowable limits during welding or grinding operations. RESPIRATORY PROTECTION: When engineering or administrative controls are not feasible to control overexposure or while they are being instituted, appropriate NIOSH respirators should be used and selected according to 29 CFR 1910.134. PROTECTION: Appropriate personal protective equipment for the eyes should be worn when there is a reasonable probability of injury due to welding or grinding. **PROTECTIVE GLOVES:** As needed to protect against physical hazards. **EMERGENCY AND FIRST AID PROCEDURES** INHALATION: If acute overexposure to fumes occurs, remove victim from the adverse environment and seek medical attention. SKIN CONTACT: If dust or mist gets on the skin, wash the contaminated skin with soap and water. Remove contaminated clothing and launder before using again. **EYE CONTACT:** Flush with large amounts of water. INGESTION: If particles are ingested, give 1 - 2 glasses of water or milk. Induce vomiting only if victim is fully conscious and has not convulsed. All ingestion cases should have immediate medical aid.

	SPILL OR	LEAK PROCEDURES
using methods which av	pills of this product would occur of dust generation and the use of NOSH approved respirator.	because of its solid form. However, if there is a spill of dust, clean-up of water, such as a vacuum. If airbome dust is generated during clean-
	CARCING	OGENIC ASSESSMENT
See appropriate attachm	ent.	
<del></del>	FIRE AND EX	(PLOSION HAZARD DATA
Flash Point:	N/A	
Flammable Limits:	N/A	
ExtInguishing Media:	Mixture of dry chemical and	sand.
Solid forms are not com- heat, flames, chemical re- protective clothing.	oustible. Fire and explosion haza action or contact with powerful oxi	ards are moderate when material is in the form of dust and exposed to dizers. Fire fighters should wear self-contained breathing apparatus and
	ADDITIO	DNAL INFORMATION
exists when handling or	processing these materials.	a competent health professional to determine whether or not a hazard
It is advised that your pa exists when handling or In case of questions, ple	processing these materials.	
exists when handling or	processing these materials.	George Phillips Sipi Metals Corp. 312/276-0070
exists when handling or In case of questions, ple	processing these materials.	George Phillips Sipi Metals Corp.